

10000Hrs Long Life Aluminum Electrolytic Capacitor

SPKE02 10,000Hrs Series

- Used in energy-saving lamps, electronic ballast, switching power supply, industrial measuring instruments, automotive applications, etc.
- Higher frequency, High ripple current, High Temperature and High dependence;
- Load life 10000Hrs at 105°C, Safety vent construction design.
- For the special designing requirement, please contact us.



Specifications

Item	Performance Characteristics												
Operating Temperature Range	-40 to +105°C												
Rated Voltage Range	160 to 450VDC												
Capacitance Range	1µF to 100µF												
Capacitance Tolerance	±20%(120Hz, +20°C)												
Leakage Current (+20°C, max)	$I \leq 0.01CV$ or $3(\mu A) + 10$ (apply rated voltage for 2 minutes).												
	I: Leakage Current(µA), C: normal capacitance(µF) V: Rated Voltage(v)												
Dissipation Factor(tan δ .max)	<table border="1"> <thead> <tr> <th>Working Voltage(VDC)</th> <th>200</th> <th>250</th> <th>350</th> <th>400</th> <th>450</th> </tr> </thead> <tbody> <tr> <td>tanδ</td> <td>0.08</td> <td>0.08</td> <td>0.10</td> <td>0.1</td> <td>0.12</td> </tr> </tbody> </table>	Working Voltage(VDC)	200	250	350	400	450	tanδ	0.08	0.08	0.10	0.1	0.12
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(+20°C, at 120Hz)													
Temperature Characteristics (120Hz)	<table border="1"> <thead> <tr> <th>Working Voltage(VDC)</th> <th>200</th> <th>250</th> <th>350</th> <th>400</th> <th>450</th> </tr> </thead> <tbody> <tr> <td>Z-40°C/Z+20°C</td> <td>5</td> <td>5</td> <td>7</td> <td>7</td> <td>7</td> </tr> </tbody> </table>	Working Voltage(VDC)	200	250	350	400	450	Z-40°C/Z+20°C	5	5	7	7	7
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Z-40°C/Z+20°C	5	5	7	7	7								
(+20°C, at 120Hz)													
Endurance	Test conditions												
	Duration time : As right												
	Ambient temperature : +105°C												
	Applied voltage : Rated DC working voltage												
	After test requirements at +20°C												
	Capacitance change : ≤±30% of the initial measured value												
	Dissipation factor : ≤300% of the initial specified value												
Leakage current : ≤200% of the initial specified value													
Shelf Life(+125°C)	Test conditions												
	Duration time : 1000Hrs												
	Ambient temperature : +105°C												
	Applied voltage : None												
	After test requirements at +20°C : Same limits as Load life												
	Pre-treatment for measurements shall be conducted after application of DC working voltage for 30 minutes												

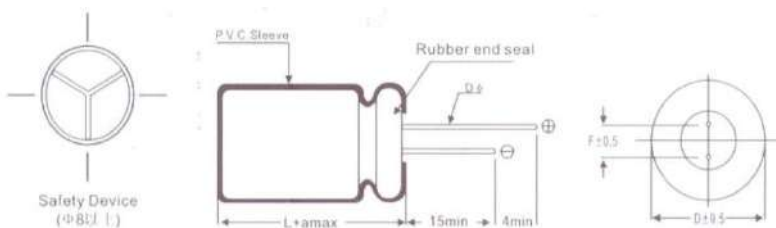
Multiplier for Ripple Current vs.Frequency

Frequency(Hz)	50	120	1k	10k-50k	100k
Multiplier	0.4	0.5	0.80	0.90	1.00

Multiplier for Ripple Current vs.Temperature

Temperature(°C)	≤60	85	105
Multiplier	2.1	1.4	1.00

Diagram of Dimensions:(unit:mm)



Dø	5	6.3	8	10	13	16	18
F	2.0	2.5	3.5	5.0	5.0	7.5	7.5
ød	0.5			0.6		0.8	
a	1.5			2.0			